

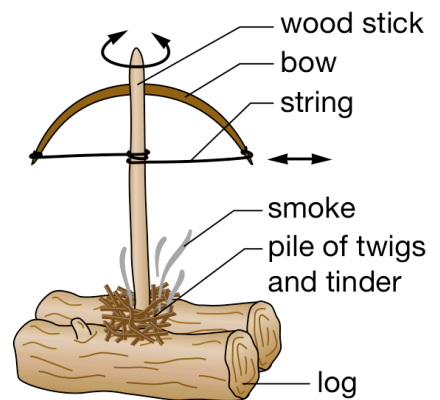
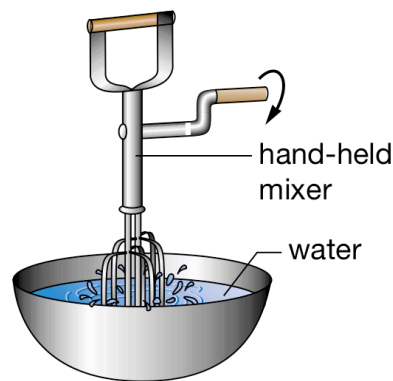
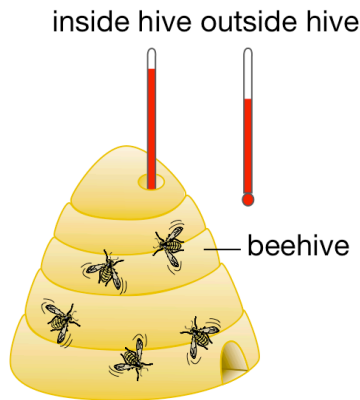
Name: _____

Date: _____ HR: _____

Detect A Connection

How does a material change when it is warmed or cooled?

How does warming or cooling affect the tiny particles of which everything is made?



Procedure

Answer the following questions below on your journal page beside the appropriate pictures.

1. One way that bees control the temperature in their hive is by beating their wings vigorously. Explain what happens to (2 marks)
 - a. the motion of the air particles in the hive
 - b. the air temperature in the hive
2. Water warms up slightly if it is stirred vigorously. (2 marks)
 - a. What happens to the motion of the water particles as they are stirred?
 - b. How is the behaviour of the water particles similar to the behaviour of the air particles in the beehive in question 1?
3. To start a fire, early people used a fire drill to twirl a stick pressed against a piece of wood. (2 marks)
 - a. What happened to the temperature at the pointed end of the drill?
 - b. What do you think caused the particles of wood to change temperature?

What Did You Find Out?

(3 marks)

4. What common feature caused the changes in temperature in each example you examined?
5. Identify at least two other situations that are similar to the three examples in the activity.